M 11

```
DDDDDDDDDDDD        CCCCCCCCCCCC  LLL
DDDDDDDDDDDD        CCCCCCCCCCCC  LLL
DDDDDDDDDDDD        CCCCCCCCCCCC  LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDD         DDD  CCC              LLL
DDDDDDDDDDDD        CCCCCCCCCCCC  LLLLLLLLLLLLLLL
DDDDDDDDDDDD        CCCCCCCCCCCC  LLLLLLLLLLLLLLL
DDDDDDDDDDDD        CCCCCCCCCCCC  LLLLLLLLLLLLLLL
```

```
                                                  M  6
**FILE**ID**RPSUB









          RRRRRRRR   PPPPPPPP     SSSSSSSS UU      UU BBBBBBBB
          RRRRRRRR   PPPPPPPP     SSSSSSSS UU      UU BBBBBBBB
          RR      RR PP      PP SS         UU      UU BB      BB
          RR      RR PP      PP SS         UU      UU BB      BB
          RR      RR PP      PP SS         UU      UU BB      BB
          RR      RR PP      PP SS         UU      UU BB      BB
          RRRRRRRR   PPPPPPPP     SSSSSS   UU      UU BBBBBBBB
          RRRRRRRR   PPPPPPPP     SSSSSS   UU      UU BBBBBBBB
          RR  RR     PP                 SS UU      UU BB      BB
          RR  RR     PP                 SS UU      UU BB      BB
          RR    RR   PP                 SS UU      UU BB      BB    ....
          RR    RR   PP                 SS UU      UU BB      BB    ....
          RR      RR PP         SSSSSSSS   UUUUUUUUUU BBBBBBBB      ....
          RR      RR PP         SSSSSSSS   UUUUUUUUUU BBBBBBBB      ....

          LL             IIIIII     SSSSSSSS
          LL             IIIIII     SSSSSSSS
          LL               II     SS
          LL               II     SS
          LL               II     SS
          LL               II     SS
          LL               II       SSSSSS
          LL               II       SSSSSS
          LL               II             SS
          LL               II             SS
          LL               II             SS
          LL               II             SS
          LLLLLLLLLL   IIIIII   SSSSSSSS
          LLLLLLLLLL   IIIIII   SSSSSSSS
```

Table of contents

```
0000            .TITLE  RPSUB - DCL RESULT PARSE SUBROUTINES
0000            .IDENT  'V04-000'
0000
0000    ;
0000    ;*************************************************************************
0000    ;*                                                                       *
0000    ;*  COPYRIGHT (c) 1978, 1980, 1982, 1984 BY                              *
0000    ;*  DIGITAL EQUIPMENT CORPORATION, MAYNARD, MASSACHUSETTS.               *
0000    ;*  ALL RIGHTS RESERVED.                                                 *
0000    ;*                                                                       *
0000    ;*  THIS SOFTWARE IS FURNISHED UNDER A LICENSE AND MAY BE USED AND COPIED *
0000    ;*  ONLY IN  ACCORDANCE WITH  THE  TERMS  OF  SUCH  LICENSE  AND WITH THE *
0000    ;*  INCLUSION OF THE ABOVE COPYRIGHT NOTICE. THIS SOFTWARE OR  ANY  OTHER *
0000    ;*  COPIES THEREOF MAY NOT BE PROVIDED OR OTHERWISE MADE AVAILABLE TO ANY *
0000    ;*  OTHER PERSON.  NO TITLE TO AND OWNERSHIP OF  THE  SOFTWARE IS  HEREBY *
0000    ;*  TRANSFERRED.                                                         *
0000    ;*                                                                       *
0000    ;*  THE INFORMATION IN THIS SOFTWARE IS  SUBJECT TO CHANGE WITHOUT NOTICE *
0000    ;*  AND  SHOULD  NOT  BE  CONSTRUED AS  A COMMITMENT BY DIGITAL EQUIPMENT *
0000    ;*  CORPORATION.                                                         *
0000    ;*                                                                       *
0000    ;*  DIGITAL ASSUMES NO RESPONSIBILITY FOR THE USE  OR  RELIABILITY OF ITS *
0000    ;*  SOFTWARE ON EQUIPMENT WHICH IS NOT SUPPLIED BY DIGITAL.              *
0000    ;*                                                                       *
0000    ;*                                                                       *
0000    ;*************************************************************************
0000    ;
0000
0000    ;++
0000    ; FACILITY:     STARLET DCL CLI
0000    ;
0000    ; ABSTRACT:     MISC SUBROUTINES
0000    ;
0000    ;
0000    ; ENVIRONMENT:  NATIVE MODE USER CODE
0000    ;
0000    ; AUTHOR:       W.H.BROWN, CREATION DATE:14-APR-77
0000    ;
0000    ; MODIFIED BY:
0000    ;
0000    ;       V03-003 PCG0003         Peter George            15-Feb-1983
0000    ;               Update to new structure level.
0000    ;               Handle larger PTR data structure.
0000    ;               Move DCL$CNVASCBIN to CONVERT.
0000    ;
0000    ;       V03-002 PCG0002         Peter George            14-Nov-1982
0000    ;               Call DCL$TRIM to process the numeric string
0000    ;               before converting it to an integer.
0000    ;
0000    ;       V03-001 PCG0001         Peter George            30-Sep-1982
0000    ;               Use new larger PTR data structure.
0000    ;--
```

```
    0000          .SBTTL  DECLARATIONS
    0000   ;
    0000   ; MACRO LIBRARY CALLS
    0000   ;
    0000
    0000          PRCDEF                          ; DEFINE PROCESS WORK AREA
    0000          WRKDEF                          ; DEFINE COMMAND WORK AREA
    0000          $SCLITABDEF                     ; DEFINE TABLE STRUCTURE
    0000          PTRDEF                          ; DEFINE RESULT PARSE DESCRIPTOR
    0000          RPWDEF                          ; RESULT PARSE WORK DEFINITIONS
    0000          PLMDEF                          ; PARAMETER LIMIT DEFINITIONS
    0000          $CLIDEF                         ; CLI DEFINITIONS
    0000          $CLIMSGDEF                      ; CLI MESSAGE DEFINITIONS
    0000
    0000
    0000   ;
    0000   ; OWN STORAGE:
    0000   ;
00000000          .PSECT  DCL$ZCODE       BYTE,RD,NOWRT
    0000
```

```
                    0000          .DSABL  LSB
                    0000          .SBTTL  GET QUALIFIER DESCRIPTOR BLOCK
                    0000  ;++
                    0000  ; FUNCTIONAL DESCRIPTION:
                    0000  ;
                    0000  ;       THIS ROUTINE IS CALLED TO LOCATE THE COMMAND QUALIFIER
                    0000  ;       DESCRIPTOR BLOCK FOR A SPECIFIC QUALIFIER.
                    0000  ;       ALTERNATE ENTRY TO CHECK THAT QUALIFIER IS A PARAMETER
                    0000  ;       QUALIFIER AS OPPOSED TO AN OUTPUT SPECIFIER.
                    0000  ;
                    0000  ; CALLING SEQUENCE:
                    0000  ;
                    0000  ;       BSB/JSB DCL$GETQUALDESC         ; GET QUALIFIER DESCRIPTOR
                    0000  ;       BSB/JSB DCL$GETPARMQUAL         ; GET PARAMETER QUALIFIER DESCRIPTOR
                    0000  ;
                    0000  ; INPUT PARAMETERS:
                    0000  ;
                    0000  ;       R1 IS THE CODE TO IDENTIFY THE QUALIFIER
                    0000  ;
                    0000  ; IMPLICIT INPUTS:
                    0000  ;
                    0000  ;       R8 = ADDRESS OF UTILITY BIT ARRAY
                    0000  ;       R9 = ADDRESS OF REQUEST DESCRIPTOR
                    0000  ;       R10 = ADDRESS OF WORK BLOCK
                    0000  ;       R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                    0000  ;
                    0000  ; OUTPUT PARAMETERS:
                    0000  ;
                    0000  ;       R2 IS THE ADDRESS OF THE QUALIFIER DESCRIPTOR BLOCK
                    0000  ;
                    0000  ; COMPLETION CODES:
                    0000  ;
                    0000  ;       R0 = SUCCESS/FAIL DEPENDING OF WHETHER THE DESCRIPTOR WAS FOUND
                    0000  ;
                    0000  ; SIDE EFFECTS:
                    0000  ;
                    0000  ;       TOP LEVEL RETURN (RET) TAKEN IF SEARCH FAILS
                    0000  ;
                    0000  ;--
                    0000
                    0000          .ENABL  LSB
                    0000
                    0000  DCL$GETPARMQUAL::                       ; GET A PARAMETER QUALIFIER DESCRIPTOR
                    0000  DCL$GETQUALDESC::                       ; FIND A QUALIFIER DESCRIPTOR
     50    51   D0  0000          MOVL    R1,R0                   ; COPY QUALIFIER NUMBER
           19   13  0003          BEQL    90$                     ; ZERO IS INVALID QUALIFIER NUMBER
  52    CA AB   D0  0005          MOVL    WRK_L_QUABLK(R11),R2    ; POINT AT START OF QUALIFIER BLOCKS
           13   13  0009          BEQL    90$                     ; BR IF NONE
           0B   11  000B          BRB     20$                     ; START OF SEARCH
     08    A2   D5  000D  10$:    TSTL    ENT_L_NEXT(R2)          ; TEST OFFSET TO NEXT
           0C   13  0010          BEQL    90$                     ; BR IF THIS IS LAST
     08    A2   C1  0012          ADDL3   ENT_L_NEXT(R2),-        ; FIND ADDRESS OF NEXT ENT BLOCK
  52    DE AB       0015                  WRK_L_TAB_VEC(R11),R2   ;
     F2    50   F5  0018  20$:    SOBGTR  R0,10$                  ; COUNT DOWN QUALIFIER NUMBER
           50   D6  001B          INCL    R0                      ; INDICATE DESCRIPTOR FOUND
                05  001D          RSB                             ; BACK TO THE CALLER
```

```
                                   001E   132
                                   001E   133 90$:    SETSTAT INVQUALNUM              ; SET ERROR-INVALID QUALIFER NUMBER
                               04  0023   134         RET                             ; GO BACK TO DISPATCHER
                                   0024   135
                                   0024   136         .DSABL  LSB
```

```
                         0024          .SBTTL  FIND COMMAND QUALIFIER
                         0024  ;++
                         0024  ; FUNCTIONAL DESCRIPTION:
                         0024  ;
                         0024  ;       THIS COROUTINE IS CALLED TO SEARCH FOR A
                         0024  ;       COMMAND QUALIFIER IN THE RANGE OF THE CURRENT COMMAND.
                         0024  ;       THE SEARCH IS DONE OUT TO THE FIRST PARAMETER APPEARING
                         0024  ;       IN THE COMMAND, THEN FROM THE START OF THE FIRST PARAMETER
                         0024  ;       IN THE RANGE OF THE CURRENT COMMAND TO THE END OF THE
                         0024  ;       RANGE OF THE CURRENT COMMAND.
                         0024  ;
                         0024  ; CALLING SEQUENCE:
                         0024  ;
                         0024  ;       BSB/JSB DCL$LOCCMDQUAL
                         0024  ;
                         0024  ; INPUT PARAMETERS:
                         0024  ;
                         0024  ;       R1 IS THE CODE OF THE QUALIFIER TO LOCATE
                         0024  ;
                         0024  ; IMPLICIT INPUTS:
                         0024  ;
                         0024  ;       R8 = ADDRESS OF UTILITY BIT ARRAY
                         0024  ;       R9 = ADDRESS OF REQUEST DESCRIPTOR
                         0024  ;       R10 = ADDRESS OF WORK BLOCK
                         0024  ;       R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                         0024  ;
                         0024  ; OUTPUT PARAMETERS:
                         0024  ;
                         0024  ;       R4 IS RETURNED AS THE ADDRESS OF THE DESCRIPTOR IF FOUND
                         0024  ;       R5 IS THE INDEX TO THE DESCRIPTOR IF FOUND
                         0024  ;
                         0024  ; COMPLETION CODES:
                         0024  ;
                         0024  ;       R0 IS SET TRUE OR FALSE DEPENDING OF SUCCESS OF SEARCH
                         0024  ;
                         0024  ; SIDE EFFECTS:
                         0024  ;
                         0024  ;       REGISTERS R4, R5 & R6 ARE USED BY THIS ROUTINE
                         0024  ;       AND MUST BE PRESERVED ACCROSS COROUTINE RETURNS.
                         0024  ;
                         0024  ;--
                         0024
                         0024 DCL$FNDCMDQUAL::                                     ; LOCATE THE COMMAND QUALIFIER
         55   01   D0    0024          MOVL    #1,R5                               ; SET INDEX TO START SEARCH
  56     40   AA   DE    0027          MOVAL   RPW_G_PRMLIM(R10),R6                ; START OF PARAMETER LIMIT DESCRIPTORS
              50   D4    002B 10$:     CLRL    R0                                  ; ASSUME NO MORE QUALIFIERS
  08 AA       55   91    002D          CMPB    R5,RPW_B_STRPARM(R10)               ; THIS DESCRIPTOR IN RANGE OF VERB
              0E   1F    0031          BLSSU   40$                                 ; BR IF YES
              06   12    0033          BNEQ    30$                                 ; BR IF WITHIN A PARAMETER
  55     01   A6   9A    0035 20$:     MOVZBL  PLM_B_FSTDESC(R6),R5                ; SET INDEX OF PLACE TO START LOOKING
              1C   13    0039          BEQL    70$                                 ; BR WHEN DONE
  02 A6       55   91    003B 30$:     CMPB    R5,PLM_B_LSTDESC(R6)                ; IS THIS WITHIN THE CURRENT PARAMETER?
              11   1A    003F          BGTRU   60$                                 ; BR IF OUT OF RANGE OF THIS PARAMETER
              3E   10    0041 40$:     BSBB    DCL$SETDESCADR                      ; SET ADDRESS OF RESULT DESCRIPTOR
     04       1C   ED    0043          CMPZV   #PTR_V_TYPE,#PTR_S_TYPE,-           ; VIELD LIMITS FOR TYPE
     00       64         0046                  PTR_C_DESCR(R4),#PTR_K_COMDQUAL     ; IF THIS A COMMAND QUALIFIER?
              04   12    0048          BNEQ    50$                                 ; BR IF NO-CONTINUE SEARCH
```

```
             50    D6  004A       INCL    R0                  ; SET SUCCESS
             9E    16  004C       JSB     @(SP)+              ; RETURN WITH QUALIFIER
             55    D6  004E  50$: INCL    R5                  ; ADVANCE INDEX TO NEXT DESCRIPTOR
             D9    11  0050       BRB     10$                 ; CHECK AGAIN
       56    04    C0  0052  60$: ADDL    #PLM_K_SIZE,R6      ; SET TO NEXT PARAMETER LIMIT DESCRIPTOR
             DE    11  0055       BRB     20$                 ; TRY NEXT PARAMETER
                   05  0057  70$: RSB                         ; RETURN WITH VALUE OR ZERO
```

```
                          0058          .SBTTL  EXTRACT RESULT DESCRIPTOR FIELDS
                          0058  ;++
                          0058  ; FUNCTIONAL DESCRIPTION:
                          0058  ;
                          0058  ;       THIS ROUTINE IS CALLED TO TAKE A RESULT DESCRIPTOR APART
                          0058  ;       AND RETURN ITS COMPONTENT PART AS INDIVIDUAL VALUES.
                          0058  ;
                          0058  ; CALLING SEQUENCE:
                          0058  ;
                          0058  ;       BSB/JSB DCL$EXTNXTDESC          ; EXTRACT NEXT DESCRIPTOR
                          0058  ;       BSB/JSB DCL$GETEXTDESC          ; GET AND EXTRACT DESCRIPTOR
                          0058  ;       BSB/JSB DCL$EXTRSLDESC          ; EXTRACT RESULT DESCRIPTOR
                          0058  ;
                          0058  ; INPUT PARAMETERS:
                          0058  ;
                          0058  ;       AT EXTRSLDESC WITH R4 CONTAINS THE ADDRESS OF THE DESCRIPTOR
                          0058  ;       AT EXTNXTDESC WITH R6 CONTAINS THE ADDRESS OF THE PARAMETER
                          0058  ;            LIMIT DESCRIPTOR.
                          0058  ;
                          0058  ; IMPLICIT INPUTS:
                          0058  ;
                          0058  ;       R8 = ADDRESS OF UTILITY BIT ARRAY
                          0058  ;       R9 = ADDRESS OF REQUEST DESCRIPTOR
                          0058  ;       R10 = ADDRESS OF WORK BLOCK
                          0058  ;       R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                          0058  ;
                          0058  ; OUTPUT PARAMETERS:
                          0058  ;
                          0058  ;       R1 = TYPE
                          0058  ;       R2 = SIZE OR VALUE DEPENDING ON THE DESCRIPTOR
                          0058  ;       R3 = ADDRESS OF THE ITEM
                          0058  ;       R4 = ADDRESS OF DESCRIPTOR
                          0058  ;
                          0058  ; COMPLETION CODES:
                          0058  ;
                          0058  ;       R0 = SUCCESS/FAILURE DEPENDING ON RESULT OF SEARCH
                          0058  ;
                          0058  ;--
                          0058          .ENABL  LSB
                          0058
                          0058  DCL$EXTNXTDESC::                        ; EXTRACT NEXT COMPLETE DESCRIPTOR
                          0058          SETSTAT FAIL                    ; ASSUME WONT FIND ONE
       55      66     9A  005A          MOVZBL  PLM_B_NXTDESC(R6),R5    ; SET POINTER TO DESCRIPTOR
               21     13  005D          BEQL    40$                     ; BR IF PARAMETER SET IS MISSING
    02 A6      55     91  005F          CMPB    R5,PLM_B_LSTDESC(R6)    ; IS THIS IN RANGE OF CURRENT PARAMETER?
               1B     1A  0063          BGTRU   40$                     ; BR IF NO
               66     96  0065          INCB    PLM_B_NXTDESC(R6)       ; ADVANCE INDEX TO NEXT
               50     D6  0067          INCL    R0                      ; SET ANY SUCCESSFUL STATUS
                          0069  DCL$GETEXTDESC::                        ; GET AND EXTRACT NEXT DESCTRIPTOR
       16     10          0069          BSBB    DCL$SETDESCADR          ; SET ADDRESS OF RESULT DESCRIPTOR
                          006B  DCL$EXTRSLDESC::                        ; EXTRACT FOR RESULT DESCRIPTION
       0C      08     EF  006B          EXTZV   #PTR_V_OFFSET,#PTR_S_OFFSET,- ; START BIT AND SIZE OF OFFSET
       53      64         006E                  PTR_C_DESCR(R4),R3      ; GET OFFSET INTO R3
53   F492    CB43     9E  0070          MOVAB   WRK_G_BUFFER(R11)[R3],R3 ; FIND ADDRESS OF ITEM IN BUFFER
       08      00     EF  0076          EXTZV   #PTR_V_VALUE,#PTR_S_VALUE,- ; START BIT AND SIZE OF VALUE
       52      64         0079                  PTR_C_DESCR(R4),R2      ; GET VALUE INTO R2
       04      1C     EF  007B          EXTZV   #PTR_V_TYPE,#PTR_S_TYPE,- ; START BIT AND SIZE OF TYPE
```

```
                 51   64      007E    260                PTR_L_DESCR(R4),R1      ; GET TYPE INTO R1
                      05      0080    261 40$:    RSB                            ;
                              0081    262
                              0081    263         .DSABL  LSB
                              0081          .SBTTL  SET RESULT DESCRIPTOR ADDRESS
                              0081     ;++
                              0081     ; FUNCTIONAL DESCRIPTION:
                              0081     ;
                              0081     ;        THIS ROUTINE IS CALLED TO SET THE ADDRESS OF A RESULT
                              0081     ;        DESCRIPTOR INTO R4.
                              0081     ;
                              0081     ; CALLING SEQUENCE:
                              0081     ;
                              0081     ;        BSB/JSB DCL$SETDESCADR
                              0081     ;
                              0081     ; INPUT PARAMETERS:
                              0081     ;
                              0081     ;        R5 CONTAINS THE INDEX FOR THE DESIRED DESCRIPTOR
                              0081     ;
                              0081     ; IMPLICIT INPUTS:
                              0081     ;
                              0081     ;        R10 = ADDRESS OF WORK BLOCK
                              0081     ;        R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                              0081     ;
                              0081     ; OUTPUT PARAMETERS:
                              0081     ;
                              0081     ;        R4 IS LOADED WITH THE ADDRESS OF THE DESCRIPTOR
                              0081     ;
                              0081     ;--
                              0081
                              0081     DCL$SETDESCADR::
      54    55    0C    C5    0081             MULL3   #PTR_C_LENGTH,R5,R4                      ; GET BYTE OFFSET OF DESCRIP
    54    F9AA  CB44    9E    0085             MOVAB   WRK_G_RESULT-PTR_C_LENGTH(R11)[R4],R4    ; GET ADDRESS OF DESCRIPTOR
                        05    008B             RSB
                        008C      .SBTTL  GET PARAMETER
                        008C  ;++
                        008C  ; FUNCTIONAL DESCRIPTION:
                        008C  ;
                        008C  ;       THIS ROUTINE IS CALLED TO SEARCH THE RESULT DESCRIPTOR
                        008C  ;       BUFFER FOR THE NEXT OCCURANCE OF A PRARMETER
                        008C  ;
                        008C  ; CALLING SEQUENCE:
                        008C  ;
                        008C  ;       BSB/JSB DCL$GETPARM             ; GET A PARAMETER
                        008C  ;
                        008C  ; INPUT PARAMETERS:
                        008C  ;
                        008C  ;       R5 CONTAINS THE INDEX OF NEXT DESCRIPTOR TO CHECK
                        008C  ;
                        008C  ; IMPLICIT INPUTS:
                        008C  ;
                        008C  ;       R8 = ADDRESS OF UTILITY BIT ARRAY
                        008C  ;       R9 = ADDRESS OF REQUEST DESCRIPTOR
                        008C  ;       R10 = ADDRESS OF WORK BLOCK
                        008C  ;       R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                        008C  ;
                        008C  ; OUTPUT PARAMETERS:
                        008C  ;
                        008C  ;       R1 CONTAINS THE TYPE OF THE DESCRIPTOR(IE:PTR_K_PARAMETR)
                        008C  ;       R2 CONTAINS THE SIZE OF THE PARAMETER
                        008C  ;       R3 CONTAINS THE PRECEEDING TERMINATOR
                        008C  ;       R4 CONTAINS THE ADDRESS OF THE PARAMETER DESCRIPTOR
                        008C  ;       R5 IS THE INDEX TO THE DESCRIPTOR
                        008C  ;
                        008C  ; COMPLETION CODES:
                        008C  ;
                        008C  ;       R0 = SUCCESS/FAIL DEPENDING ON THE RESULT OF THE SEARCH
                        008C  ;
                        008C  ;--
                        008C
                        008C  DCL$GETPARM::                           ; GET THE NEXT PARAMETER
                        008C          SETSTAT FAIL                    ; ASSUME NO MORE PARAMETERS
           55     D6    008E  10$:    INCL    R5                      ; ADVANCE INDEX
           D7     10    0090          BSBB    DCL$GETEXTDESC          ; GET DESCRIPTOR AND EXTRACT FIELDS
     04    18     EF    0092          EXTZV   #PTR_V_TERM,#PTR_S_TERM,- ; GET THE TERMINATOR FORM THE PRVIOUS
53      F4 A4           0095                  -PTR_C_LENGTH(R4),R3    ; DESCRIPTOR AND SAVE IN R3
     04    51     91    0098          CMPB    R1,#PTR_K_ENDLINE       ; IS THIS THE END OF LINE?
           08     13    009B          BEQL    30$                     ; NO MORE PARAMETERS
     03    51     91    009D          CMPB    R1,#PTR_K_PARAMETR      ; IS THE CURRENT A PARAMETER?
           EC     12    00A0          BNEQ    10$                     ; BR IF NO-TRY NEXT
                        00A2          SETSTAT SUCCESS                 ; SET FOUND ONE
                  05    00A5  30$:    RSB                             ; RETURN TO CALLER
```

```
                          00A6              .SBTTL  RESULT PARSE INIT
                          00A6      ;++
                          00A6      ; FUNCTIONAL DESCRIPTION:
                          00A6      ;
                          00A6      ;       THIS ROUTINE IS CALLED TO ESTABLISH INITIAL CONDITIONS
                          00A6      ;       IN THE RESULT PARSE WORK AREA PRIOR TO PERFORMAING
                          00A6      ;       A RESULT PARSE.
                          00A6      ;
                          00A6      ; CALLING SEQUENCE:
                          00A6      ;
                          00A6      ;       ENTERED VIA A CASE FOLLOWED BY A CALL
                          00A6      ;
                          00A6      ; IMPLICIT INPUTS:
                          00A6      ;
                          00A6      ;       R9 = ADDRESS OF REQUEST DESCRIPTOR
                          00A6      ;       R10 = ADDRESS OF WORK BLOCK
                          00A6      ;       R11 = ADDRESS OF PASS 1 PARSE WORK AREA
                          00A6      ;
                          00A6      ; OUTPUT PARAMETERS:
                          00A6      ;
                          00A6      ;       THE RESULT PARSE WORK AREA IS INITED
                          00A6      ;
                          00A6      ; COMPLETION CODES:
                          00A6      ;
                          00A6      ;       R0 = SUCCESS
                          00A6      ;
                          00A6      ;--
                          00A6
                          00A6      DCL$RPINIT::                                      ; RESULT APRSE INIT
                62    10  00A6              BSBB    DCL$GETDCLWRK                     ; GET POINTER TO DCL PHASE 1 WORK AREA
      00    6A    00  2C  00A8              MOVC5   #0,(R10),#0,-                     ; SOURCE BUFFER SIZE AND FILL OF 0 TO
   04 AA    007C  8F      00AC                      #CLI$C_WORKAREA-4,4(R10)          ; ZERO OUT THE WORK AREA
      04 AA       5B  D0  00B1              MOVL    R11,RPW_L_DCLWRK(R10)             ; SAVE WORK AREA ADDRESS FOR LATER
      57    C6 AB     D0  00B5              MOVL    WRK_L_PROPTR(R11),R7              ; GET ADDRESS OF COMMAND PROMPT TABLE
      56    40 AA     DE  00B9              MOVAL   RPW_G_PRMLIM(R10),R6              ; GET ADDRESS OF FIRST PARAM LIMIT TABLE
                  55  D4  00BD              CLRL    R5                                ; INIT INDEX TO MINUS FIRST DESCRIPTOR
                  CB  10  00BF              BSBB    DCL$GETPARM                       ; RETREIVE THE NEXT(FIRST)PARAMETER
      08 AA       55  90  00C1              MOVB    R5,RPW_B_STRPARM(R10)             ; SAVE THE INDEX TO THE FIRST PARAMETER
            3A    50  E9  00C5              BLBC    R0,90$                            ; BR IF NO PARAMETERS IN COMMAND
      01 A6       55  90  00C8      10$:    MOVB    R5,PLM_B_FSTDESC(R6)              ; SET FIRST PARAMETER IN THIS LIST
         66       55  90  00CC              MOVB    R5,PLM_B_NXTDESC(R6)              ; ALSO THE NEXT TO PROCESS
                  BB  10  00CF      20$:    BSBB    DCL$GETPARM                       ; LOCATE THE NEXT PARAMETER IN THE COMD
   02 A6    55    01  83  00D1              SUBB3   #1,R5,PLM_B_LSTDESC(R6)           ; SET INDEX OF THE LAST PARAMETER SEEN
            29    50  E9  00D6              BLBC    R0,90$                            ; BR IF NO MORE
         01       53  91  00D9              CMPB    R3,#PTR_K_BLANK                   ; IS THIS THE START OF A PARMETER LIST?
                  16  13  00DC              BEQL    50$                               ; BR IF YES
                  07  E0  00DE              BBS     #ENT_V_IMPCAT,-                   ; IF COMMAND HAS IMPLIED CONCATONATION
         EC 04    A7      00E0                      ENT_B_FLAGS(R7),20$               ; THEN KEEP LOOKING TILL END OF PARAMETER
         05       53  91  00E3              CMPB    R3,#PTR_K_COMMA                   ; ELSE LOOK FOR PARAMETER LIST SEPARATOR
                  E7  12  00E6              BNEQ    20$                               ; IF NO A SEPARATOR, CONTINUE SCAN
         01       53  91  00E8      40$:    CMPB    R3,#PTR_K_BLANK                   ; SCAN FOR LAST PARAMETER IN THE LIST
                  07  13  00EB              BEQL    50$                               ; BR IF FOUND LAST PARAMETER
                  9D  10  00ED              BSBB    DCL$GETPARM                       ; SEARCH FOR NEXT PARAMETER
            10    50  E9  00EF              BLBC    R0,90$                            ; BR IF RAN OUT OF PARAMETERS
                  F4  11  00F2              BRB     40$                               ; CHECK FOR BLANKS
         08 A7        C1  00F4      50$:    ADDL3   ENT_L_NEXT(R7),-                  ; SKIP TO NEXT DESCRIPTOR
      57    DE AB         00F7                      WRK_L_TAB_VEC(R11),R7             ;
```

```
03 A6       55   90  00FA          MOVB    R5,PLM_B_TRMDESC(R6)     ; SAVE DESCRIPTOR OF PARAMETER TERMINATOR
            86   D5  00FE          TSTL    (R6)+                    ; POINT AT NEXT PARAMETER LIMIT DESCRIPTOR
            C6   11  0100          BRB     10$                      ; SCAN NEXT PARAMETER
                     0102  90$:    SETSTAT SUCCESS                  ; SET ALL IS GOOD
03 A6       55   90  0105          MOVB    R5,PLM_B_TRMDESC(R6)     ; SAVE FINAL TERMINATOR
                 04  0109          RET                              ; RETURN TO DISPATCHER
                     010A  ;
                     010A  ; SET WORK ADDRESS
                     010A  ;
                     010A  DCL$GETDCLWRK::                          ;
00000000'EF      16  010A          JSB     CLI$GET_PRC              ; GET ADDRESS OF CLI PROCESS WORK AREA
5B    04 AB      D0  0110          MOVL    PRC_L_SAVFP(R11),R11     ; GET ADDRESS OF COMMAND WORK AREA
                 05  0114          RSB                              ; RETURN TO CALLER
                     0115          .END
```

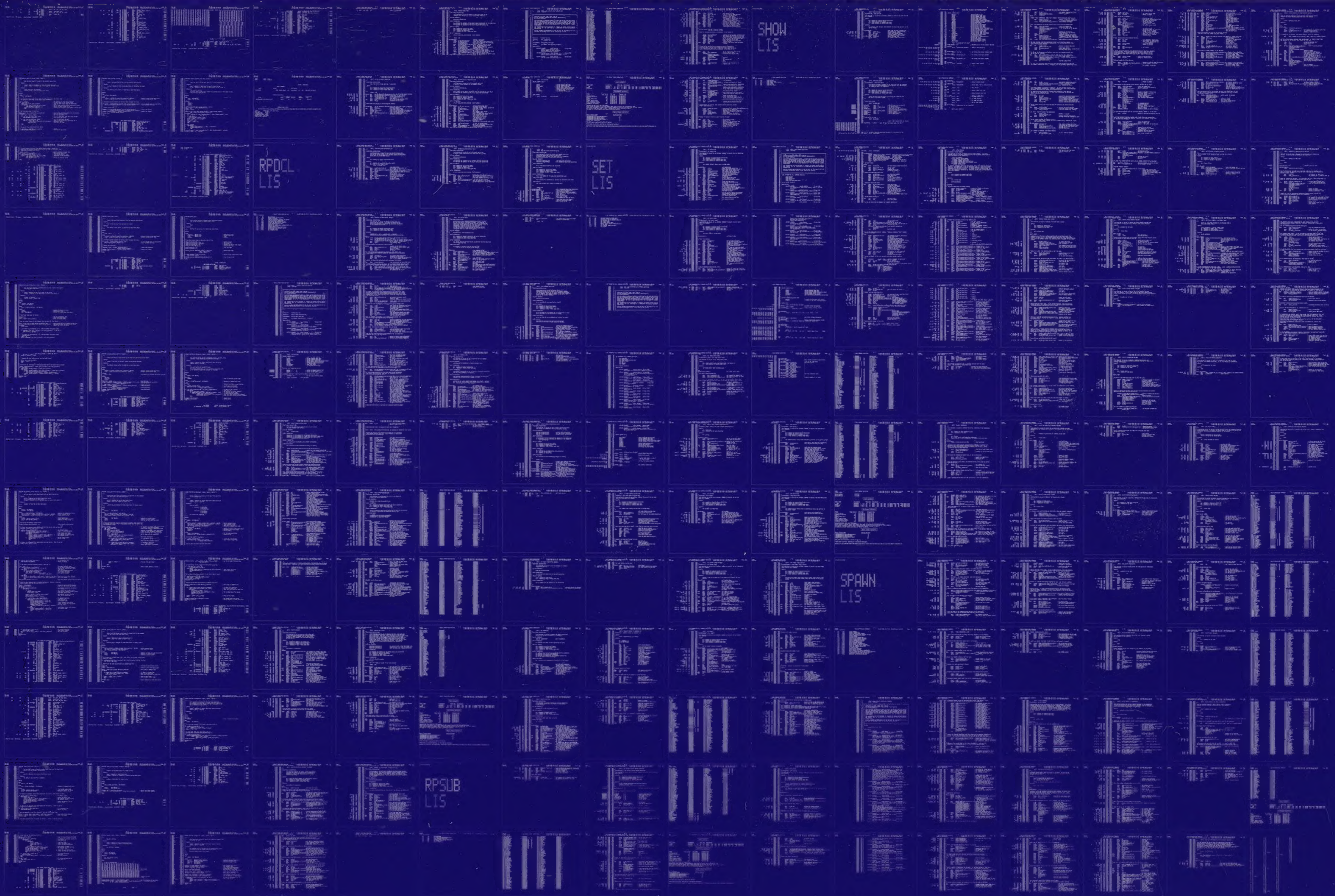
```
CLI$C_WORKAREA                       = 00000080                 PRC_L_OUTRABCTX                   00000118
CLI$GET_PRC                            ********    X    02      PRC_L_PPFLIST                     00000070
CLI$_INVQUALNUM                      = 0003881A                 PRC_L_RECALLPTR                   0000012F
DCL$EXTNXTDESC                         00000058 RG      02      PRC_L_RESTART                     00000058
DCL$EXTRSLDESC                         0000006B RG      02      PRC_L_SAVAP                       00000000
DCL$FNDCMDQUAL                         00000024 RG      02      PRC_L_SAVFP                       00000004
DCL$GETDCLWRK                          0000010A RG      02      PRC_L_SEVERITY                    00000050
DCL$GETEXTDESC                         00000069 RG      02      PRC_L_SPWN                        000000C0
DCL$GETPARM                            0000008C RG      02      PRC_L_STACKLM                     000000A4
DCL$GETPARMQUAL                        00000000 RG      02      PRC_L_STACKPT                     000000A0
DCL$GETQUALDESC                        00000000 RG      02      PRC_L_STATUS                      00000054
DCL$RPINIT                             000000A6 RG      02      PRC_L_STS                         00000084
DCL$SETDESCADR                         00000081 RG      02      PRC_L_STV                         00000088
ENT_L_NEXT                           = 00000008                 PRC_L_SYMBOL                      00000060
ENT_V_IMPCAT                         = 00000007                 PRC_L_TMBX                        00000074
ENT_W_FLAGS                          = 00000004                 PRC_L_TRMLIST                     00000010
PLM_B_FSTDESC                          00000001                 PRC_Q_ALLOCREG                    00000020
PLM_B_LSTDESC                          00000002                 PRC_Q_COMMAND                     000000E0
PLM_B_NXTDESC                          00000000                 PRC_Q_FLUSHTIME                   000000D0
PLM_B_QUADESC                          00000003                 PRC_Q_GLOBAL                      00000028
PLM_B_TRMDESC                          00000003                 PRC_Q_IMAGENAME                   000000D8
PLM_C_SIZE                             00000004                 PRC_Q_KEYPAD                      00000040
PLM_K_SIZE                             00000004                 PRC_Q_LABEL                       00000030
PRC_B_CONTINUE                         000000F3                 PRC_Q_LOCAL                       00000038
PRC_B_DEFRADIX                         000000AE                 PRC_Q_SAVEPRIV                    000000E8
PRC_B_EXMDEPMOD                        000000AD                 PRC_T_OUTDVI                      0000011C
PRC_B_EXMDEPWID                        000000AC                 PRC_W_ASTIOSB                     000000C6
PRC_B_EXONLYL                          0000012D                 PRC_W_ASTRETN                     000000C8
PRC_B_FLAGS2                           000000AF                 PRC_W_ASTSTATUS                   000000C4
PRC_B_IMGFLAG                          00000078                 PRC_W_ATTMBX                      0000007A
PRC_B_OUTFLAGS                         0000012C                 PRC_W_FLAGS                       00000068
PRC_B_PROMPTLEN                        000000F0                 PRC_W_INPCHAN                     00000064
PRC_C_LENGTH                           00000534                 PRC_W_ONLEVEL                     0000006A
PRC_G_COMMANDS                         00000133                 PRC_W_OUTIFI                      00000114
PRC_G_PROMPT                           000000F4                 PRC_W_OUTISI                      00000116
PRC_K_LENGTH                           00000534                 PRC_W_OUTMBXCHN                   000000CA
PRC_L_CURRKEY                          00000048                 PRC_W_OUTMBXREF                   000000CE
PRC_L_EXMDEPADR                        000000A8                 PRC_W_OUTMBXSIZ                   000000CC
PRC_L_EXTARG                           00000094                 PRC_W_PMPTCTRL                    000000F1
PRC_L_EXTBLK                           0000008C                 PRC_W_WAITIOSB                    00000066
PRC_L_EXTCOD                           0000009C                 PTR_B_LEVEL                       00000004
PRC_L_EXTHND                           00000090                 PTR_B_NUMBER                      00000005
PRC_L_EXTPRM                           00000098                 PTR_B_PARMCNT                     00000006
PRC_L_IDFLNK                           000000BC                 PTR_B_VALUE                       00000000
PRC_L_IMGACTSTS                        00000080                 PTR_C_LENGTH                      0000000C
PRC_L_INDCLOCK                         0000007C                 PTR_K_BLANK                     = 00000001
PRC_L_INDEPTH                          0000005C                 PTR_K_COMDQUAL                  = 00000000
PRC_L_INDFAB                           0000001C                 PTR_K_COMMA                     = 00000005
PRC_L_INDINPRAB                        00000014                 PTR_K_ENDLINE                   = 00000004
PRC_L_INDOUTRAB                        00000018                 PTR_K_LENGTH                      0000000C
PRC_L_INPRAB                           00000008                 PTR_K_PARAMETR                  = 00000003
PRC_L_LASTKEY                          0000004C                 PTR_L_DESCR                       00000000
PRC_L_LSTSTATUS                        000000B0                 PTR_L_ENTITY                      00000008
PRC_L_ONCTLY                           000000B8                 PTR_S_OFFSET                    = 0000000C
PRC_L_ONERROR                          0000006C                 PTR_S_TERM                      = 00000004
PRC_L_OUTOFBAND                        000000B4                 PTR_S_TYPE                      = 00000004
PRC_L_OUTRAB                           0000000C                 PTR_S_VALUE                     = 00000008
```

```
PTR_V_OFFSET                    = 00000008
PTR_V_TERM                      = 00000018
PTR_V_TYPE                      = 0000001C
PTR_V_VALUE                     = 00000000
RPW_B_LSTDESC                     00000009
RPW_B_STRPARM                     00000008
RPW_C_HDRSIZ                      00000040
RPW_C_LENGTH                      00000080
RPW_G_BITS                        00000020
RPW_G_PRMLIM                      00000040
RPW_K_HDRSIZ                      00000040
RPW_K_LENGTH                      00000080
RPW_L_DCLWRK                      00000004
RPW_L_USERCTX                     00000000
WRK_B_CMDOPT                      FFFFFFC3
WRK_B_MAXPARM                     FFFFFFD0
WRK_B_MINPARM                     FFFFFFD1
WRK_B_PARMCNT                     FFFFFFCE
WRK_B_PARMSUM                     FFFFFFCF
WRK_B_RECALLCNT                   FFFFFFC5
WRK_B_VALLEV                      FFFFFFC4
WRK_B_VERBTYP                     FFFFFFC2
WRK_C_LENGTH                      FFFFF486
WRK_G_BUFFER                      FFFFF492
WRK_G_INPBUF                      FFFFF896
WRK_G_RESULT                      FFFFF9B6
WRK_K_LENGTH                      FFFFF486
WRK_L_CHARPTR                     FFFFF48E
WRK_L_DISALLOW                    FFFFFFE6
WRK_L_ERRORRTN                    FFFFF9AE
WRK_L_EXPANDPTR                   FFFFF486
WRK_L_IMAGE                       FFFFFFE2
WRK_L_MARKPTR                     FFFFF48A
WRK_L_PAROUT                      FFFFFFD2
WRK_L_PMPTADDR                    FFFFF9A2
WRK_L_PROMPTRTN                   FFFFF9A6
WRK_L_PROPTR                      FFFFFFC6
WRK_L_QUABLK                      FFFFFFCA
WRK_L_READRTN                     FFFFF9AA
WRK_L_RECALLPTR                   FFFFFFEA
WRK_L_RSLEND                      FFFFFFB6
WRK_L_RSLNXT                      FFFFFFBA
WRK_L_SAVAP                       FFFFFFF8
WRK_L_SAVFP                       FFFFFFFC
WRK_L_SAVSP                       FFFFFFF4
WRK_L_SIGNALRTN                   FFFFFFD6
WRK_L_SPECRTN                     FFFFF9B2
WRK_L_TAB_VEC                     FFFFFFDE
WRK_L_VERB                        FFFFFFBE
WRK_W_FLAGS                       FFFFFFF0
WRK_W_FLAGS2                      FFFFFFF2
WRK_W_IMGCHAN                     FFFFFFEE
WRK_W_PMPTLEN                     FFFFF99E
```

```
                                                +----------------+
                                                ! Psect synopsis !
                                                +----------------+

PSECT name                      Allocation          PSECT No.  Attributes
----------                      ----------          ---------  ----------
.  ABS  .                       00000000  (     0.)  00 (  0.)  NOPIC    USR    CON    ABS    LCL NOSHR NOEXE NORD   NOWRT NOVEC BYTE
$ABS$                           FFFFFFFC  (     0.)  01 (  1.)  NOPIC    USR    CON    ABS    LCL NOSHR   EXE   RD     WRT NOVEC BYTE
DCL$ZCODE                       00000115  (   277.)  02 (  2.)  NOPIC    USR    CON    REL    LCL NOSHR   EXE   RD   NOWRT NOVEC BYTE

                                             +------------------------+
                                             ! Performance indicators !
                                             +------------------------+

Phase                    Page faults    CPU Time       Elapsed Time
-----                    -----------    --------       ------------
Initialization                     9    00:00:00.11    00:00:00.42
Command processing                83    00:00:00.81    00:00:05.05
Pass 1                           250    00:00:09.13    00:00:22.27
Symbol table sort                  0    00:00:01.20    00:00:02.81
Pass 2                            72    00:00:01.69    00:00:06.40
Symbol table output               20    00:00:00.16    00:00:00.68
Psect synopsis output              2    00:00:00.02    00:00:00.02
Cross-reference output             0    00:00:00.00    00:00:00.00
Assembler run totals             436    00:00:13.14    00:00:37.67

The working set limit was 1200 pages.
45492 bytes (89 pages) of virtual memory were used to buffer the intermediate code.
There were 50 pages of symbol table space allocated to hold 815 non-local and 18 local symbols.
415 source lines were read in Pass 1, producing 13 object records in Pass 2.
34 pages of virtual memory were used to define 20 macros.

                                            +--------------------------+
                                            ! Macro library statistics !
                                            +--------------------------+

Macro library name                           Macros defined
------------------                           --------------
_$255$DUA28:[SYSLIB]SYSBLDMLB.MLB;1                     0
_$255$DUA28:[DCL.OBJ]DCL.MLB;1                          8
_$255$DUA28:[SYS.OBJ]LIB.MLB;1                          0
_$255$DUA28:[SYSLIB]STARLET.MLB;2                       4
TOTALS (all libraries)                                 12

956 GETS were required to define 12 macros.

There were no errors, warnings or information messages.

MACRO/LIS=LIS$:RPSUB/OBJ=OBJ$:RPSUB MSRC$:RPSUB/UPDATE=(ENH$:RPSUB)+EXECML$/LIB+LIB$:DCL/LIB+SYS$LIBRARY:SYSBLDMLB/LIB
```

0073 AH-BT13A-SE
VAX/VMS V4.0

DIGITAL EQUIPMENT CORPORATION
CONFIDENTIAL AND PROPRIETARY



SHOW
LIS

RPDCL
LIS

SET
LIS

SPAWN
LIS

RPSUB
LIS